AMENDMENTS TO THE CLAIMS

This listing of claims will replace all prior versions, and listings, of claims in the application.

Listing of Claims:

1.   (Currently Amended) A method for driving a liquid crystal display, comprising ~~the steps of~~:

receiving source data;

reducing the number of bits of the source data, thereby generating a reduced-bit source data;

comparing the reduced-bit source data of a previous frame with the reduced-bit source data of a current frame to select a preset modulated data in accordance with the result of the comparison, wherein a bit number of the reduced-bit source data of the previous frame is the same as that of the current frame, and a bit number of the preset modulated data is more than that of the reduced-bit source data of each previous frame and current frame; and

modulating the source data by using the selected modulated data.

2.   (Original) The method of claim 1, wherein the selected modulated data is set to be a minimum value within a data band that includes a plurality of initial modulated data, wherein each of the initial modulated data is larger than a current data value of the current frame, when the current data value of the current frame is larger than a previous data value of a previous frame.

3.   (Original) The method of claim 1, wherein the selected modulated data is set to

be a maximum value within a data band that includes a plurality of initial modulated data,

wherein each of the initial modulated data is smaller than a current data value of the current

frame, when the current data value of the current frame is smaller than a previous data value of a

previous frame

4.   (Currently Amended) The method of claim 1, wherein the source data is

modulated to a current data value of the current frame, in ~~the step of~~ modulating the source data,

when the current data value of a current frame is the same as a previous data value of the

previous frame.

5.   (Currently Amended) The method of claim 1, further comprising ~~the step of~~

delaying the reduced-bit source data by one frame interval.

6.   (Original)   The method of claim 5, wherein the source data is an 8-bit data,

and the reduced-bit source data is a 7-bit data.

7.   (Currently Amended) A method for driving a liquid crystal display, comprising:

setting a first <u>n bit</u> modulated data that has a larger value than a data value of a current

frame in accordance with an increase of the data value<u>, wherein n is a positive integer</u>;

setting a second <u>n bit</u> modulated data that has a smaller value than the data value of the

current frame in accordance with a decrease of the data value;

storing in a storage memory an n-bit source data, wherein n is a positive integer;

determining whether [[a]] <u>an n-k bit</u> source data of the current frame is identical ~~in n-k~~

~~bits~~ to [[a]] an n-k bit source data of the previous frame stored in the storage memory, wherein

k is a positive integer less than n; and

supplying the n bit source data of the current frame to a liquid crystal display panel or

modulating [[the]] an n-k bit source data by using the first and second n bit modulated data in

accordance with a result of the judging step.

8.   (Original) The method of claim 7, wherein n is 8 and k is 1.

9.   (Currently Amended) The method of claim 7, wherein the supplying the source

data includes:

supplying the n bit source data of the current frame to the liquid crystal display panel,

when the n-bit source data value of the current frame is identical to the source data value of the

previous frame; and

comparing n-k bits from the source data of the current frame with corresponding n-k bits

from the source data of the previous frame, wherein k is a positive integer less than n, to

modulate the source data by using the first and second modulated data, when the n bit source

data value of the current frame differs from the n bit source data value of the previous frame.

10.   (Currently Amended) The method of claim 9, wherein modulating the n-k bit

source data includes:

modulating the n-k bit source data by using the first modulated data, when the n bit

source data value of the current frame is larger than the n bit source data value of the previous

frame; and

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modulating the n-k bit source data by using the second modulated data, when the n bit

source data value of the current frame is smaller than the n bit source data value of the previous

frame.

11.   (Currently Amended) An apparatus for driving a liquid crystal display,

comprising:

an input line for receiving source data;

a bit converter for reducing the number of bits of the received source data to generate

reduced-bit source data; and

a modulator for comparing the reduced-bit source data of a current frame with [[the]]

reduced bit source data of a previous frame to modulate the source data by using a preset

modulated data in accordance with a result of the comparison, wherein a bit number of the

reduced-bit source data of the previous frame is the same as that of the current frame, and a bit

number of the preset modulated data is more than that of the reduced-bit source data of each

previous frame and current frame.

12.   (Original) The apparatus of claim 11, wherein the selected modulated data is set

to be a minimum value within a data band that includes a plurality of initial modulate data, and

each of the initial modulate data is larger than a current data value of the current frame, when the

current data value of the current frame is larger than a previous data value of the previous frame.

13.   (Original) The apparatus of claim 11, wherein the selected modulated data is set

to be a maximum value within a data band that includes a plurality of initial modulated data, and

each of the initial modulated data is smaller than a current data value of the current frame, when

the current data value of the current frame is smaller than a previous data value of the previous

frame.

14.   (Currently Amended) The apparatus of claim 11, wherein the source data is

modulated to [[a]] the current data value of the current frame, when the current data value of the

current frame is the same as a previous data value of the previous frame[[,]].

15.   (Original)   The apparatus of claim 11, wherein the modulator includes:

a frame memory for delaying the reduced-bit source data for one frame interval; and

a lookup table for comparing the reduced-bit source data of the previous frame with the

reduced-bit source data of the current frame to select a preset modulated data in accordance with

the result of the comparison.

16.   (Original)   The apparatus for driving according to claim 15, wherein the bit

converter is connected between the frame memory and an input terminal of the lookup table.

17.   (Original)   The apparatus for driving according to claim 11, wherein the

source data is an 8-bit data, and the reduced-bit source data is a 7-bit data.

18.   (Currently Amended) An apparatus for driving a liquid crystal display,

comprising:

a liquid crystal display panel comprising a plurality of data lines, and a plurality of gate

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lines, wherein the data lines cross the gate lines, and a liquid crystal cell is formed at a pixel area

between a data line and a gate line;

an input line for receiving n-bit source data, wherein n is a positive integer;

a storage memory for storing the received source data;

a comparator for determining whether [[the]] an n-k bit source data of a current frame is

identical in n-k bits to the source data of a previous frame from stored in the storage memory,

wherein k is a positive integer less than n; and

a modulator for registering a first n bit modulated data that has a larger value than a data

value of the current frame in accordance with an increase of the data value, and a second n bit

modulated data that has a smaller value than the data value of the current frame in accordance

with a decrease of the data value, and for supplying the source data of the current frame to the

liquid crystal display panel, or modulating the n-k bit source data by using the first and second n

bit modulated data in accordance with a judgment result of the comparator.

19.   (Currently Amended) The apparatus of claim 18, wherein the comparator

supplies the data of the current frame to the liquid crystal display panel when the data value is

the same between the previous frame and the current frame, and supplies the n-k bit source data

of the current frame and the n-k bit source data of the previous frame to the modulator when the

data value is not the same between the previous frame and the current frame.

20.   (Currently Amended) The apparatus of claim 18, wherein the comparator

supplies the data of the current frame to the liquid crystal display panel when the data value is

the same between the previous frame and the current frame, and supplies the n-k bit source data

of the current frame and the n-k bit source data of the previous frame to the modulator when the

data value is not the same between the previous frame and the current frame.

21.   (Currently Amended) The apparatus of claim 18, further comprising:

a data driver for supplying the n bit modulated data from the modulator to the data line of

the liquid crystal display panel;

a gate driver for supplying a scan signal to the gate line of the liquid crystal display

panel; and

a timing controller for controlling the data driver and the gate driver.

22.   (Original)   The apparatus of claim 21, wherein the modulator is a lookup table

integrated into the timing controller.

23.   (Original)   The apparatus of claim 18, wherein n is 8, and k is 1.